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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/799,661

03/15/2004

Atsushi Narusawa

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EXAMINER

RILEY, MARCUS T

ART UNIT

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/799,661

Applicant(s)

NARUSAWA, ATSUSHI

Examiner

Marcus T. Riley

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 3/15/2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 3/15/2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date <u>attached</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 101

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

The USPTO "Interim Guidelines for Examination of Patent Applications for Patent Subject Matter Eligibility" (Official Gazette notice of 22 November 2005), Annex IV, reads as follows:

Descriptive material can be characterized as either "functional descriptive material" or "nonfunctional descriptive material." In this context, "functional descriptive material" consists of data structures and computer programs which impart functionality when employed as a computer component. (The definition of "data structure" is "a physical or logical relationship among data elements, designed to support specific data manipulation functions." The New IEEE Standard Dictionary of Electrical and Electronics Terms 308 (5th ed. 1993).) "Nonfunctional descriptive material" includes but is not limited to music, literary works and a compilation or mere arrangement of data.

When functional descriptive material is recorded on some computer-readable medium it becomes structurally and functionally interrelated to the medium and will be statutory in most cases since use of technology permits the function of the descriptive material to be realized. Compare *In re Lowry*, 32 F.3d 1579, 1583-84, 32 USPQ2d 1031, 1035 (Fed. Cir. 1994) (claim to data structure stored on a computer readable medium that increases computer efficiency held statutory) and *Warmerdam*, 33 F.3d at 1360-61, 31 USPQ2d at 1759 (claim to computer having a specific data structure stored in memory held statutory product-by-process claim) with *Warmerdam*, 33 F.3d at 1361, 31 USPQ2d at 1760 (claim to a data structure per se held nonstatutory).

In contrast, a claimed computer-readable medium encoded with a computer program is a computer element which defines structural and functional interrelationships between the computer program and the rest of the computer which permit the computer program's functionality to be realized, and is thus statutory. See *Lowry*, 32 F.3d at 1583-84, 32 USPQ2d at 1035.

2. **Regarding claims 15 and 16;** claims 15 and 16 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter as follows. Claims 15 and 16 define a computer program embodying functional descriptive material. However, the claim does not define a computer-readable medium or memory and is thus non-statutory for that reason (i.e., "When functional descriptive material is recorded on some computer-readable medium it

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becomes structurally and functionally interrelated to the medium and will be statutory in most cases since use of technology permits the function of the descriptive material to be realized” – Guidelines Annex IV). That is, the scope of the presently claimed computer program can range from paper on which the program is written, to a program simply contemplated and memorized by a person. The examiner suggests amending the claim to embody the program on “computer-readable medium” or equivalent in order to make the claim statutory. Any amendment to the claim should be commensurate with its corresponding disclosure.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. **Claims 1-16** are rejected under 35 U.S.C. 103(a) as being unpatentable over Enomota (US 6,801,334 B1 hereinafter, Enomota ‘334) in combination with Li et al. (US2003/0076521 A1 hereinafter, Li ‘521).

Regarding claim 1; Enomota ‘334 discloses an information processing device for determining the image rendering positions within an image of various objects constituting the image, and outputting to image rendering means layout information including image rendering commands for rendering the objects in their positions, comprising: a simulation function which, when said predetermined image rendering command is not usable, simulates image rendering

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corresponding to said predetermined image rendering command using an image rendering command that can be used by said image rendering means, and outputs layout information including the simulation result (*"If the film image to be processed is the film image which is not subjected to the non-standard image processing by the image processor 140 when the main print is produced, the determination in step 250 is negated. Then, the routine moves to step 266 so that simulation image data (image data subjected to the image processing equivalent to the standard image processing) of the film image to be processed is fetched. Then, conversion of the resolution is performed for the purpose of producing the index print. In step 268 simulation image data subjected to the conversion of the resolution is stored at a storage position on a storage region of a storage means (for example, the frame memory 142 of the image processor section 136) corresponding to a predetermined layout (a layout in which each index image is disposed on the index print). The simulation image data is stored as index image data."* column 40, lines 22-37).

Enomota '334 does not expressly disclose a function for placing an inquiry with said image rendering means as to whether a predetermined image rendering command is usable or not.

Li '521 discloses a function for placing an inquiry with said image rendering means as to whether a predetermined image rendering command is usable or not (*"Furthermore, each utility has an associated list of predetermined, and fixed, printer-setting parameters."* page 2, paragraph 0019). See also (*"...the network system or application, may implement a printer inquiry routine to determine the model name, or number, of local printer available prior to supplying any list of available utilities."* page 2, paragraph 0020).

Enomota '334 and Li '521 are combinable because they are from same field of endeavor of information processing devices (*"The print manager process provides the user with the printer driver's graphics user interface..."* Li '521 at page 2, paragraph 0012).

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to modify the information processing device as taught by Enomota '334 by adding a function for placing an inquiry with said image rendering means as to whether a predetermined image rendering command is usable or not as taught by Li '521.

The motivation for doing so would have been because it advantageous to simplify the use of a printer when using an image editing application (*"It is another object of the present invention to simplify the use of a printer when using an image editing application."* Li '521 at page 2, paragraph 0015).

Therefore, it would have been obvious to combine Enomota '334 with Li '521 to obtain the invention as specified in claim 1.

Regarding claim 2; Enomoto '334 discloses where said simulation function simulates image rendering corresponding to said predetermined image rendering command using an image rendering command for at least one of a text object, an image object, a border object, and a background object (*"In step 266 resolution of simulation image data subjected to the above processing is converted for the purpose of producing an index print. In step 268, simulation image data subjected to the conversion of the resolution is, as index image data..."* column 42, lines 49-53).

Regarding claim 3; Enomoto '334 discloses analysis means for analyzing a document described in a structured tag language, and extracting therefrom objects constituting an image

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("...image processing system is structured so that the data of an original image is temporarily stored in a memory, the data of the original image is then read from the memory, and the read data of the original image is then subjected to an image processing in accordance with the contents (whether or not each type of image data processing is executed and the processing conditions of executed image data processings) of the processing previously determined on the basis of the results of analysis of the contents of the image. Thus, image data of the main image is output as data." column 2, lines 22-32).

Regarding claim 4; Enomoto '334 discloses where said predetermined image rendering command or object is an image rendering command or object relating to interactive input/output *("The image processor 140 according to the third and fourth embodiments is connected to the input/output controller 134. Thus, image data subjected to the image processing is temporarily stored in the frame memory 142, and then output to the input/output controller 134 at predetermined times. The image processor section 136B has the same structure as that of the above image processor section 136A. Therefore, a description of the image processor section 136B is omitted." column 29, lines 34-42).*

Regarding claim 5; Enomoto '334 discloses where said predetermined image rendering command or object is an image rendering command or object used in the image rendering of an input form *("The image processor 140 according to the third and fourth embodiments is connected to the input/output controller 134. Thus, image data subjected to the image processing is temporarily stored in the frame memory 142, and then output to the input/output controller 134 at predetermined times. The image processor section 136B has the same structure as that of*

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the above image processor section 136A. Therefore, a description of the image processor section 136B is omitted." column 29, lines 34-42).

Regarding claim 6; Enomoto '334 discloses image rendering means for rendering an image on the basis of said layout information, wherein said image rendering means inform said information processing device of an image rendering command or object that can be used by said image rendering means in response to an inquiry from said information processing device ("*...the index print producing method according to the first aspect of the present invention enables an index print having a plurality of images disposed in a predetermined layout to be produced in such a way that the completed main image of each of the images can easily be recognized. Namely, by referring to each image on the index print, it can be easily ascertained which of the plurality of main images output from the image processing system corresponds to which image on the index print.*" column 7, lines 7-15).

Regarding claim 7; Enomoto '334 discloses an information processing device for determining the image rendering positions within an image of various objects constituting the image, and outputting to image rendering means layout information including said image rendering positions, comprising: a simulation function which, when said predetermined object cannot be rendered, simulates image rendering of said predetermined object using an object that can be rendered by said image rendering means, and outputs layout information including the simulation result ("*If the film image to be processed is the film image which is not subjected to the non-standard image processing by the image processor 140 when the main print is produced, the determination in step 250 is negated. Then, the routine moves to step 266 so that simulation image data (image data subjected to the image processing equivalent to the standard image*

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processing) of the film image to be processed is fetched. Then, conversion of the resolution is performed for the purpose of producing the index print. In step 268 simulation image data subjected to the conversion of the resolution is stored at a storage position on a storage region of a storage means (for example, the frame memory 142 of the image processor section 136) corresponding to a predetermined layout (a layout in which each index image is disposed on the index print). The simulation image data is stored as index image data." column 40, lines 22-37).

Enomota '334 does not expressly disclose a function for placing an inquiry with said image rendering means as to whether a predetermined object can be rendered or not.

Li '521 discloses a function for placing an inquiry with said image rendering means as to whether a predetermined object can be rendered or not ("*Furthermore, each utility has an associated list of predetermined, and fixed, printer-setting parameters.*" page 2, paragraph 0019). See also ("*...the network system or application, may implement a printer inquiry routine to determine the model name, or number, of local printer available prior to supplying any list of available utilities.*" page 2, paragraph 0020).

Enomota '334 and Li '521 are combinable because they are from same field of endeavor of information processing devices ("*The print manager process provides the user with the printer driver's graphics user interface...*" Li '521 at page 2, paragraph 0012).

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to modify the information processing device as taught by Enomota '334 by adding a

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function for placing an inquiry with said image rendering means as to whether a predetermined object can be rendered or not as taught by Li '521.

The motivation for doing so would have been because it advantageous to simplify the use of a printer when using an image editing application (*"It is another object of the present invention to simplify the use of a printer when using an image editing application."* Li '521 at page 2, paragraph 0015).

Therefore, it would have been obvious to combine Enomoto '334 with Li '521 to obtain the invention as specified in claim 7.

Regarding claim 8; Enomoto '334 discloses where said simulation function simulates image rendering of said predetermined object using at least one of a text object, an image object, a border object, and a background object (*"In step 266 resolution of simulation image data subjected to the above processing is converted for the purpose of producing an index print. In step 268, simulation image data subjected to the conversion of the resolution is, as index image data..."* column 42, lines 49-53).

Regarding claim 9; Enomoto '334 discloses analysis means for analyzing a document described in a structured tag language, and extracting therefrom objects constituting an image (*"...image processing system is structured so that the data of an original image is temporarily stored in a memory, the data of the original image is then read from the memory, and the read data of the original image is then subjected to an image processing in accordance with the contents (whether or not each type of image data processing is executed and the processing conditions of executed image data processings) of the processing previously determined on the*

basis of the results of analysis of the contents of the image. Thus, image data of the main image is output as data." column 2, lines 22-32).

Regarding claim 10; Enomoto '334 discloses where said predetermined image rendering command or object is an image rendering command or object relating to interactive input/output (*"The image processor 140 according to the third and fourth embodiments is connected to the input/output controller 134. Thus, image data subjected to the image processing is temporarily stored in the frame memory 142, and then output to the input/output controller 134 at predetermined times. The image processor section 136B has the same structure as that of the above image processor section 136A. Therefore, a description of the image processor section 136B is omitted."* column 29, lines 34-42).

Regarding claim 11; Enomoto '334 discloses where said predetermined image rendering command or object is an image rendering command or object used in the image rendering of an input form (*"The image processor 140 according to the third and fourth embodiments is connected to the input/output controller 134. Thus, image data subjected to the image processing is temporarily stored in the frame memory 142, and then output to the input/output controller 134 at predetermined times. The image processor section 136B has the same structure as that of the above image processor section 136A. Therefore, a description of the image processor section 136B is omitted."* column 29, lines 34-42).

Regarding claim 12; Enomoto '334 discloses an image rendering means for rendering an image on the basis of said layout information, wherein said image rendering means inform said information processing device of an image rendering command or object that can be used by said

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image rendering means in response to an inquiry from said information processing device (*"...the index print producing method according to the first aspect of the present invention enables an index print having a plurality of images disposed in a predetermined layout to be produced in such a way that the completed main image of each of the images can easily be recognized. Namely, by referring to each image on the index print, it can be easily ascertained which of the plurality of main images output from the image processing system corresponds to which image on the index print."* column 7, lines 7-15).

Regarding claim 13; Enomoto '334 discloses an information processing method for determining the image rendering positions within an image of various objects constituting the image, and outputting layout information including image rendering commands for rendering the objects in their positions, comprising the steps of: when said predetermined image rendering command is not usable, simulating image rendering corresponding to said predetermined image rendering command using an image rendering command that can be used by said image rendering means, and outputting layout information including the simulation result (*"If the film image to be processed is the film image which is not subjected to the non-standard image processing by the image processor 140 when the main print is produced, the determination in step 250 is negated. Then, the routine moves to step 266 so that simulation image data (image data subjected to the image processing equivalent to the standard image processing) of the film image to be processed is fetched. Then, conversion of the resolution is performed for the purpose of producing the index print. In step 268 simulation image data subjected to the conversion of the resolution is stored at a storage position on a storage region of a storage means (for example, the frame memory 142 of the image processor section 136) corresponding to a*

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predetermined layout (a layout in which each index image is disposed on the index print). The simulation image data is stored as index image data." column 40, lines 22-37).

Enomota '334 does not expressly disclose placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined image rendering command is usable or not.

Li '521 discloses placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined image rendering command is usable or not (*"Furthermore, each utility has an associated list of predetermined, and fixed, printer-setting parameters."* page 2, paragraph 0019). See also (*"...the network system or application, may implement a printer inquiry routine to determine the model name, or number, of local printer available prior to supplying any list of available utilities."* page 2, paragraph 0020).

Enomota '334 and Li '521 are combinable because they are from same field of endeavor of information processing devices (*"The print manager process provides the user with the printer driver's graphics user interface..."* Li '521 at page 2, paragraph 0012).

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to modify the information processing device as taught by Enomota '334 by adding placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined image rendering command is usable or not as taught by Li '521.

The motivation for doing so would have been because it advantageous to simplify the use of a printer when using an image editing application (*"It is another object of the present invention to simplify the use of a printer when using an image editing application."* Li '521 at page 2, paragraph 0015).

Therefore, it would have been obvious to combine Enomota '334 with Li '521 to obtain the invention as specified in claim 13.

Regarding claim 14; Enomota '334 discloses an information processing method for determining the image rendering positions within an image of various objects constituting the image, and outputting layout information including said image rendering positions, comprising the steps of: when said predetermined object cannot be rendered, simulating image rendering of said predetermined object using an object that can be rendered by said image rendering means, and outputting layout information including the simulation result (*"If the film image to be processed is the film image which is not subjected to the non-standard image processing by the image processor 140 when the main print is produced, the determination in step 250 is negated. Then, the routine moves to step 266 so that simulation image data (image data subjected to the image processing equivalent to the standard image processing) of the film image to be processed is fetched. Then, conversion of the resolution is performed for the purpose of producing the index print. In step 268 simulation image data subjected to the conversion of the resolution is stored at a storage position on a storage region of a storage means (for example, the frame memory 142 of the image processor section 136) corresponding to a predetermined layout (a layout in which each index image is disposed on the index print). The simulation image data is stored as index image data."* column 40, lines 22-37).

Enomota '334 does not expressly disclose placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined object can be rendered or not.

Li '521 discloses placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined object can be rendered or not (*"Furthermore, each utility has an associated list of predetermined, and fixed, printer-setting parameters."* page 2, paragraph 0019). See also (*"...the network system or application, may implement a printer inquiry routine to determine the model name, or number, of local printer available prior to supplying any list of available utilities."* page 2, paragraph 0020).

Enomota '334 and Li '521 are combinable because they are from same field of endeavor of information processing devices (*"The print manager process provides the user with the printer driver's graphics user interface..."* Li '521 at page 2, paragraph 0012).

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to modify the information processing device as taught by Enomota '334 by adding placing an inquiry with image rendering means, which serve as an output destination for the layout information, as to whether a predetermined object can be rendered or not as taught by Li '521.

The motivation for doing so would have been because it advantageous to simplify the use of a printer when using an image editing application (*"It is another object of the present invention to simplify the use of a printer when using an image editing application."* Li '521 at page 2, paragraph 0015).

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Therefore, it would have been obvious to combine Enomota '334 with Li '521 to obtain the invention as specified in claim 14.

Regarding claim 15; Enomota '334 discloses a program for causing a computer to execute the information processing method according to claim 13 ("*...and image data produced by a computer (hereinafter, the above image data items are collectively called "file image data") The above image data may be input from outside (for example, input through a recording medium, such as a memory card or input from another information processing device through a communication line).*" column 23, lines 34-40).

Regarding claim 16; Enomota '334 discloses a program for causing a computer to execute the information processing method according to claim 14 ("*...and image data produced by a computer (hereinafter, the above image data items are collectively called "file image data") The above image data may be input from outside (for example, input through a recording medium, such as a memory card or input from another information processing device through a communication line).*" column 23, lines 34-40).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marcus T. Riley whose telephone number is 571-270-1581. The examiner can normally be reached on Monday - Friday, 7:30-5:00, est.


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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Twyler Lamb can be reached on 571-272-7406. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Marcus T. Riley
Assistant Examiner
Art Unit 2625



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